

Unit - 2

Weather and Climate



Learning Objectives

- ▶ To understand the importance of weather and climate
- ▶ To learn about the nature of the elements of weather and climate.
- ▶ To know the instruments used for measuring weather elements
- ▶ To be able to recognize the kind of weather and climate of a place



Introduction

Climate is one of the basic elements in the natural environment. It affects landforms, soil types, fauna and flora. It influences man to a large extent.

In a small village in Dharmapuri district, Tamil nadu, in the month of May, Yuktha enjoys her vacation with her brother and family. She always wears cotton cloths. Her mother makes food like porridge, buttermilk, lemonade, watermelon etc which suits to summer. At the same time (In May month) Tiya who lives in Auckland, New Zealand with her father and mother wear fleece jacket, jeans, gloves and socks. Her mother makes hot food like sandwich, salmon, oatmeal, soups etc. Yuktha celebrates Christmas with friends in winter, where as Tiya celebrates Christmas during summer. Can you think of why?

Yuktha and Tiya stay in two different hemispheres and have different way of life. This is because of the difference in weather condition of those places.

Weather and climate influence man's activities like what we eat, wear, the house

in which we live and work, farming, sailing, fishing, modern transport and even our play time etc. Hence one should have knowledge about the weather and climate. So, in this chapter we are going to learn about weather and climate, its elements and how they influence our lifestyle.

Weather

Weather is the day today conditions (state) of the atmosphere at any place as regards sunshine, temperature, cloud cover, wind fog condition, air pressure, humidity, precipitation and such other elements. It refers to short periods like a day, a week, a month or a little longer and as such the weather changes from time to time in a day and one period to the other in an year. In the



Earth's atmosphere is a layer of gases surrounding the planet earth and retained by the earth's gravity. It contains about 78% nitrogen, 21% oxygen, 0.97% argon, 0.03% carbon dioxide and 0.04% trace amounts of other gases and water vapour.